

**Amendments to the Claims:**

This listing of claims will replace all prior versions, and listings, of claims in the application:

**Listing of Claims:**

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1. (Currently Amended) A computing device, comprising:  
a communications bus;  
a display configured to display in more than one display mode and coupled to the communications bus;  
a processor, coupled to the display and to the communications bus; and  
a random access memory coupled to the communications bus, the random access memory being partially allocated as a frame buffer, the random access memory being a unified memory, the random access memory configured to receive and provide access to display information to be communicated to the display, the random access memory being controlled by display logic, the display logic being configured to manage the memory and allocate the memory according to the display mode by sizing the frame buffer and the display logic is configured to automatically change the display mode and the size of the frame buffer during operation of an application running on the computing device according to changing graphical needs of the application, available unified memory space, and available power, the display modes including at least one of resolution modes and color modes.
2. (Previously Presented) The computing device of claim 1, wherein the display mode is initiated dependent upon the application running on the processor.
3. (Original) The computing device of claim 1, wherein the display mode is dependent upon the available memory.
4. (Original) The computing device of claim 1, wherein the display mode is dependent upon the available memory bandwidth.

5. (Original) The computing device of claim 1, wherein the more than one display mode includes a high resolution display mode.

6. (Original) The computing device of claim 1, wherein the more than one display mode includes a low resolution display mode.

7. (Original) The computing device of claim 1, wherein the more than one display mode includes a 18 bit color display mode.

8. (Original) The computing device of claim 1, wherein the more than one display mode includes a 24 bit color display mode.

9. (Original) The computing device of claim 1, wherein the more than one display mode includes an 8 bit display mode.

10. (Original) The computing device of claim 1, wherein the more than one display mode includes a display mode having up to 25,600 pixels.

11. (Original) The computing device of claim 1, wherein the more than one display mode includes a display mode having up to 102,400 pixels.

12. (Original) The computing device of claim 1, wherein the more than one display mode includes a text display mode.

13. (Original) The computing device of claim 1, wherein the more than one display mode includes a monochrome display mode.

14. (Original) The computing device of claim 1, wherein the memory includes random access memory (RAM).

15. (Currently Amended) A personal digital assistant, comprising:  
a communication bus;  
a display configured to display in more than one display mode and coupled to the communications bus;  
a processor, coupled to the display and to the communications bus; and  
a unified memory coupled to the communications bus, the unified memory configured to receive and provide access to display information to be communicated to the display, the unified memory being controlled by display logic, the display logic being configured to manage the unified memory and allocate the unified memory according to the display mode and the display logic is configured to ~~automatically~~ change the display mode during the operation of an application running on the personal digital assistant according to changing graphical needs of the application, available unified memory space, and available power, the display modes including at least one of resolution modes and color modes.

16. (Previously Presented) The personal digital assistant of claim 15, wherein the display mode is initiated dependent upon the application running on the processor.

17. (Original) The personal digital assistant of claim 15, wherein the display mode is dependent upon a mode signal from the operating system.

18. (Original) The personal digital assistant of claim 15, wherein the display mode is dependent upon the display requirements of an application running on the processor.

19. (Original) The personal digital assistant of claim 15, wherein the display includes a touch screen.

20. (Original) The personal digital assistant of claim 15, wherein the unified memory includes random access memory (RAM).

21. (Original) The personal digital assistant of claim 15, wherein further comprising:  
a display controller, wherein the display controller is configured to perform the display logic.

22. (Currently Amended) A computing device, comprising:  
a communications bus;  
a display configured to display in more than one display mode and coupled to the communications bus;  
a processor, coupled to the display and to the communications bus;  
a unified memory coupled to the communications bus, the unified memory configured to receive and provide access to display information to be communicated to the display, the unified memory being controlled by display logic, the display logic being configured to manage the unified memory and allocate the unified memory according to the display mode and the display logic being configured to automatically change the display mode during operation of an application running on the computing device according to changing graphical needs of the application, available unified memory space, and available power, the display modes including at least one of resolution modes and color modes; and  
a display controller, the display controller configured to perform the display logic.

23. (Previously Presented) The computing device of claim 22, wherein the display mode is initiated dependent upon the application running on the processor.

24. (Original) The computing device of claim 22, wherein the display mode is dependent upon a mode signal from the operating system.

25. (Original) The computing device of claim 22, wherein the display mode is dependent upon the display requirements of an application running on the processor.

26. (Original) The computing device of claim 22, wherein the display includes a touch screen.

27. (Original) The computing device of claim 22, wherein the unified memory includes random access memory (RAM).

28. (Original) The computing device of claim 22, wherein the computing device is included in a personal digital assistant.

29. (Original) The computing device of claim 22, wherein the computing device is included in a cellular phone.

30. (Previously Presented) The computing device of claim 22, wherein the computing device is included in a handheld device.

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